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A revision of *Porocallus* SHARP. IV. A new species from China and additional records (Coleoptera: Staphylinidae: Aleocharinae)

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A b s t r a c t : *Porocallus cicatricatus* nov.sp. (China: southeastern Yunnan) is described and illustrated. Additional records of two previously described species are reported. The currently known distributions of all the species of *Porocallus* SHARP, 1888 are mapped. The East Palaearctic genus now includes seven species.

K e y w o r d s : Coleoptera, Staphylinidae, Aleocharinae, Oxypodini, *Porocallus*, China, new species, new records, distribution map.

Introduction

The oxypodine genus *Porocallus* SHARP, 1888 previously included six species, five of which have been recorded from South China. Only the type species, *P. insignis* SHARP, 1888, is widespread and distributed in China, the Russian Far East, North and South Korea, and Japan (ASSING 2006, 2012). A distribution map was provided by ASSING (2012). Except for *P. insignis*, all the species of the genus are known only from their respective type localities, suggesting that their reproduction habitat is cryptic, probably subterranean.

The present paper is based on material from the collection of Michael Schülke (Berlin), which has been examined since the previous contribution. A study of this material yielded a new species from Yunnan, China, and additional records of *P. insignis* and *P. wrasei* ASSING, 2012.

Material and methods

The material treated in this study is deposited in the following collections:

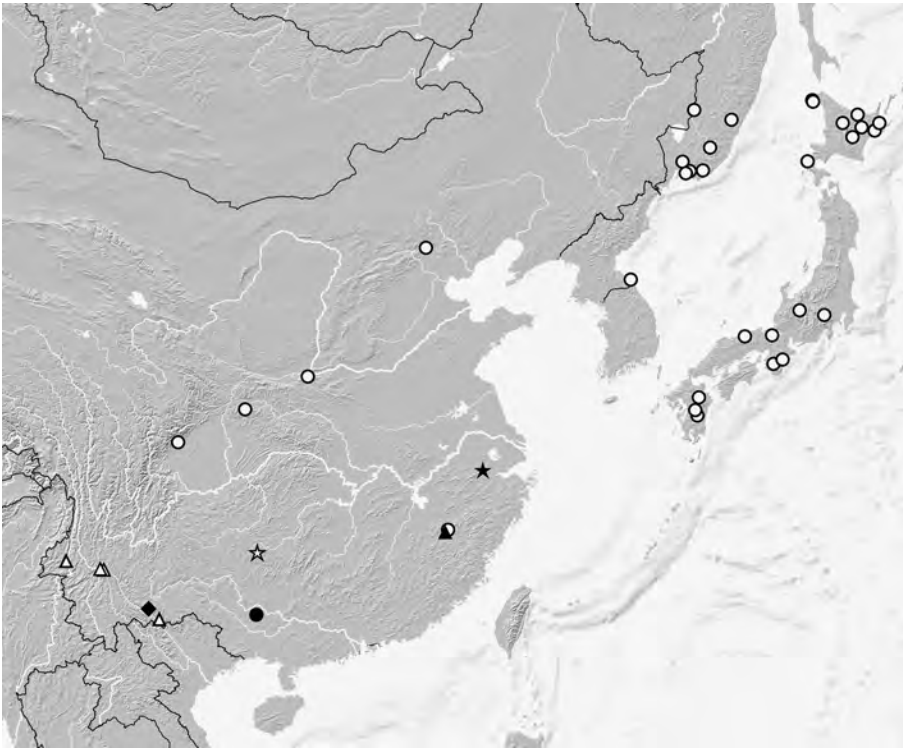
cAss..... author's private collection

cSch..... private collection Michael Schülke, Berlin

The morphological studies were conducted using a Stemi SV 11 microscope (Zeiss Germany) and a Jenalab compound microscope (Carl Zeiss Jena). The images of external

characters were created using a photographing device constructed by Arved Lompe (Nienburg) and CombineZ software. A digital camera (Nikon Coolpix 995) was used for the remaining photographs. The map was created using MapCreator 2.0 (primap) software.

Body length was measured from the anterior margin of the labrum to the abdominal apex, the length of the forebody from the anterior margin of the labrum to the posterior margin of the elytra, head length from the anterior margin of the clypeus (without anteclypeus) to the posterior constriction of the head, elytral length at the suture from the apex of the scutellum to the posterior margin of the elytra, and the length of the aedeagus from the apex of the ventral process to the base of the aedeagal capsule. The "parameral" side (i.e., the side where the sperm duct enters) is referred to as the ventral, the opposite side as the dorsal aspect.



Map 1: Distribution of the genus *Porocallus* in the East Palaearctic region: *P. insignis* SHARP (open circles); *P. wrasei* ASSING (open triangles); *P. cicatricatus* nov.sp. (filled diamond); *P. ligo* ASSING (open star); *P. sinensis* PACE (filled circle); *P. hlavaci* ASSING (filled triangle); *P. tianmuensis* PACE (filled star).

Description and additional records

Porocallus insignis SHARP, 1888 (Map 1)

Material examined: China: 1♂ [teneral], 1♀, Shaanxi, Micang Shan, 33 km S Hanzhong, 32°45'N, 106°53'E, 1360 m, stream valley, forest margin, litter and soil sifted, 15.VIII.2012, leg. Schülke (cSch, cAss).

Comment: The above record is within the known range of *P. insignis* (Map 1).

Porocallus wrasei ASSING, 2012 (Figs 1-4, Map 1)

Material examined: China: Yunnan: 1♂, 1♀, SE Pingbian, Dawei Shan Virgin Forest Park, 22°55'N, 103°42'E, 2100 m, subtropical primary broad-leaved forest, litter sifted, 28.VIII.2014, leg. Schülke (cSch); 1♂, Pu'er Pref., Ailao Shan, 37 km NW Jingdong, 24°45'N, 100°41'E, 2300 m, degraded forest remnant, litter, moss, and grass roots sifted, 13.IX.2009, leg. Wrase (cAss); 1♀, Lincang/Dali Pref., Wuliang Shan, old pass road, N pass, 24°45'N, 100°30'E, 2350 m, forest remnant and tea plantation, litter and grass sifted, 16.IX.2009, leg. Schülke (cAss).

Comment: The original description of *P. wrasei* is based on a male holotype and a female paratype from a locality in the Gaoligong Shan, to the southeast of Tengchong, western Yunnan. Remarkable differences were observed in the male and female sexual characters of the above specimens from the Dawei Shan on the one hand and those from the Wuliang Shan and Ailao Shan on the other (Figs 1-4). Regarding these characters, however, the type material is somewhat intermediate. Therefore, and since no significant external differences were found, the observed variation is interpreted as intraspecific.

The currently known distribution is illustrated in Map 1.

Porocallus cicatricatus nov.sp. (Figs 5-10, Map 1)

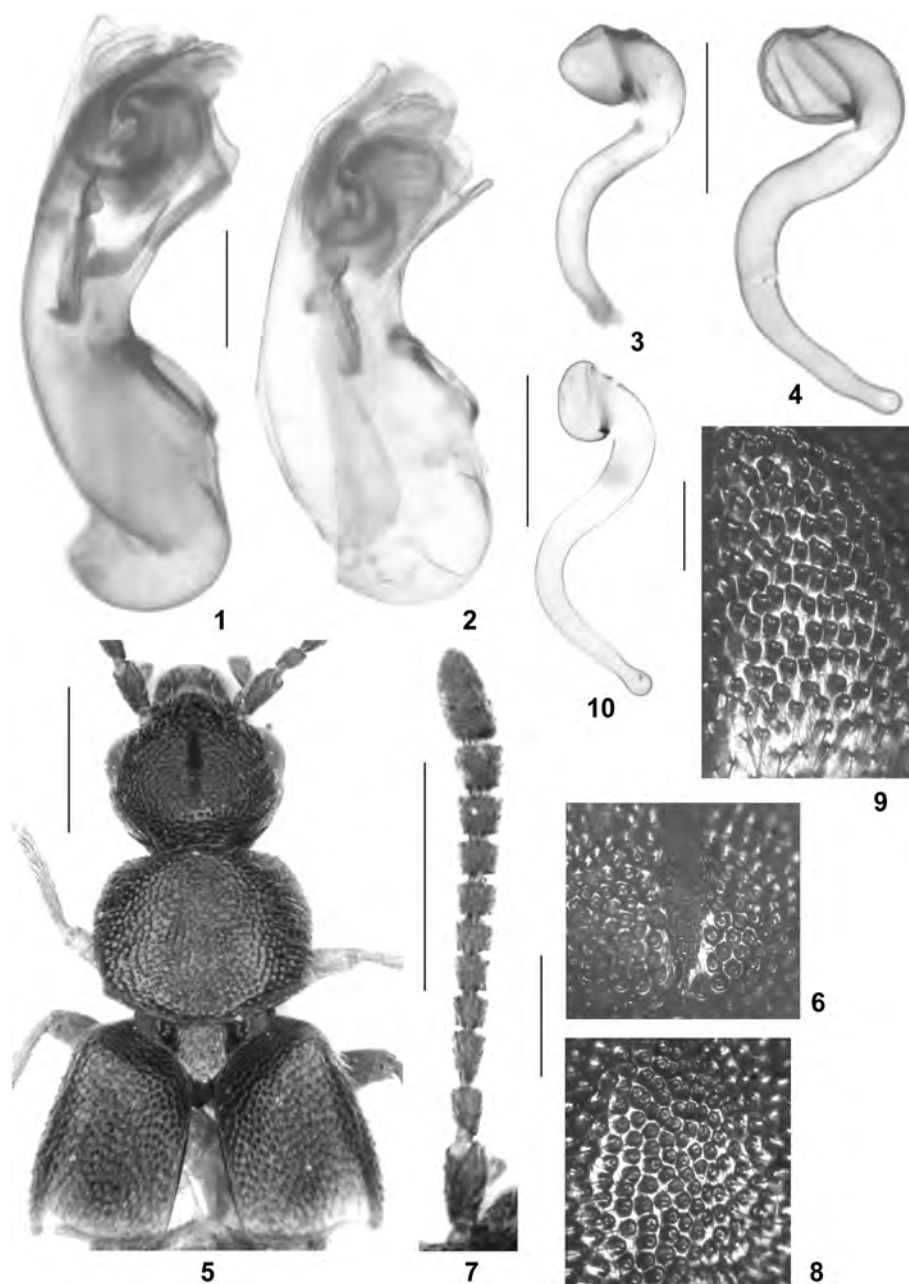
Type material: Holotype ♀: "CHINA: Yunnan, S Gejiu, 1860 m, 23°17'14"N, 103°08'41"E, grassy slope with shrubs near road, litter, soil, and moss sifted, 21.VIII.2014, leg. M. Schülke [CH14-17] / Holotypus ♀ *Porocallus cicatricatus* sp. n., det. V. Assing 2015" (cAss).

Etymology: The specific epithet (Latin, past participle of the verb cicatricare: scarred) alludes to the conspicuously matt median band on the vertex.

Description: Small species; body length 4.2 mm; length of forebody 2.0 mm. Coloration: body blackish, with the posterior margins of the elytra broadly yellowish, particularly at the postero-lateral angles; legs dark-yellowish; antennae brown.

Head (Fig. 5) 1.18 times as broad as long, broadest across eyes; punctuation extremely dense and umbilicate; midline distinctly and rather broadly impunctate and with pronounced microsculpture (Fig. 6); interstices reduced to very narrow ridges; surface nearly matt. Eyes large and moderately bulging, approximately as long as distance from posterior margin of eye to posterior constriction in dorsal view. Antenna short, 1.3 mm long, and shaped as in Fig. 7.

Pronotum (Fig. 5), 1.23 times as broad as long and 1.2 times as broad as head, broadest approximately in the middle; lateral margins distinctly convex in dorsal view; posterior angles obtusely marked; punctuation (Fig. 8) similar to that of head.



Figs 1-10: *Porocallus wrasei* from Wuliang Shan (1), Ailao Shan (3), and Dawei Shan (2, 4), and *P. cicatricatus* nov.sp. (5-10): median lobe of aedeagus in lateral view (1-2); spermatheca (3-4, 10)); forebody (5); postero-median portion of head (6); antenna (7); median portion of pronotum (8); postero-lateral portion of elytra (9). Scale bars: 5, 7: 0.5 mm; 1-4, 10: 0.2 mm; 6, 8-9: 0.1 mm.

Elytra (Fig. 5) 0.93 times as long as pronotum; punctation coarser than that of head and pronotum, but with more glossy interstices, particularly in posterior portion (Fig. 9). Hind wings present. Metatarsomere I longer than the combined length of II-IV.

Abdomen narrower than elytra; tergites III-V with deep, coarsely punctate anterior impressions, tergite VI without distinct impression but anteriorly coarsely punctate; remainder of tergal surfaces with rather sparse and moderately fine punctation; interstices without microsculpture and glossy; posterior margin of tergite VII with palisade fringe.

♂: unknown.

♀: spermatheca 0.45 mm long and shaped as in Fig. 10.

Comment: Although the male sexual characters are unknown, a description of this species seems justified in view of the numerous characters distinguishing it from all other *Porocallus* species.

Comparative notes: *Porocallus cicatricatus* differs from its congeners by its small body size, the conspicuous sculpture along the dorsal midline of the head (if this is not a teratology), the short and not very massive antenna, the more glossy forebody, and by the coloration of the elytra. For illustrations of other *Porocallus* species see ASSING (2001, 1007, 2012) and PACE (1992, 2012).

Distribution and natural history: The type locality is situated near Gejiu in southeastern Yunnan, China, not far from the border with Vietnam (Map 1). The slightly teneral holotype was sifted from litter, moss, and soil beneath bushes on a grassy slope at an altitude of 1860 m.

Acknowledgements

My thanks are extended to Michael Schülke (Berlin) for the permission to retain the holotype of *P. cicatricatus*.

Zusammenfassung

Porocallus cicatricatus nov.sp. (China: Südost-Yunnan) wird beschrieben und abgebildet. Weitere Nachweise von zwei bereits beschriebenen Arten werden gemeldet. Die derzeit bekannte Verbreitung aller Arten der Gattung *Porocallus* SHARP, 1888 wird anhand einer Karte illustriert. Die ostpaläarktische Gattung enthält gegenwärtig sieben beschriebene Arten.

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